

AMENDMENTS TO THE CLAIMS

Amend the claims as follows. This listing of claims will replace all prior versions, and listings, of claims in the application:

LISTING OF CLAIMS

1. (Currently amended) An interface connectable as a default host interface to a peripheral or as a default peripheral interface to a host, for serial data communication between a host and a peripheral during a session, and comprising:

a power signal contact;

at least one data signal contact;

first automated means for periodically checking a connection by periodically starting a session when connected as a default host interface; ~~and~~

second automated means for periodically checking a connection by periodically requesting a session when connected as a default peripheral interface; and

wherein when connected as a default host interface, the first automated means for periodically checking a connection is operable to periodically apply a voltage to the power signal contact and to receive a response via the data signal contact, and when connected as a default peripheral interface, the second automated means for periodically checking a connection is operable to periodically request a session via the power signal contact and the data signal contact and receive a response via the power signal contact.

2. (Original) An interface as claimed in claim 1, wherein a session identifies the presence of a connected device.

3. (Cancelled)

4. (Cancelled)

5. (Previously presented) An interface as claimed in claim 1, wherein a session identifies the capabilities of a connected device.

6. (Currently amended) An interface, for serial data communication between a host and a peripheral, the interface connectable as a default host interface or as a default peripheral interface and comprising:

a power signal contact;

at least one data signal contact;

transmission means for repeatedly sending a poll signal via the power signal contact to check a connection; and

reception means for receiving a reply signal via the power signal contact if the interface is connected as a default peripheral interface, and the data signal contact if the interface is connected as a default host interface, wherein the reply signal indicates the presence of a connected device.

7. (Original) An interface as claimed in claim 6, wherein the poll signals are sent periodically as a train of voltage pulses.

8. (Original) An interface as claimed in claim 7, wherein each pulse of the train has a duration greater than 200ms.

9. (Previously presented) An interface as claimed in claim 7, wherein the poll signals have a periodicity of the order of 1 Hz such that each pulse of the train is separated from its neighbor by the same duration of the order of 1 second.

10. (Previously presented) An interface as claimed in claim 6, wherein the transmission means is operable to repeatedly send a poll signal only via the power signal contact if the interface is connected as a default host interface.

11. (Previously presented) An interface as claimed in claim 6 wherein the transmission means is operable to repeatedly send both a first poll signal via the power signal contact and a second poll signal via the data signal contact, if the interface is connected as a default peripheral interface.

12. (Previously presented) An interface as claimed in claim 6, further comprising an identifier contact for identifying whether the interface is connected to a peripheral or a host.

13. (Cancelled)

14. (Previously presented) An interface as claimed in claim 6, wherein a session is started that identifies the capabilities of a connected device.

15. (Previously presented) A host interface, for serial data communication between a host and a connected peripheral during a session, the host interface comprising:

a power signal contact for supplying power to the connected peripheral;

at least one data signal contact for serially communicating data between the host and connected peripheral;

means for periodically checking for disconnection from the peripheral comprising:

transmission means for repeatedly sending a poll signal via the power signal contact;

reception means for receiving a reply signal via the data signal contact; and

detection means for detecting the absence of a reply signal and the disconnection of the peripheral.

16. (Original) A host interface as claimed in claim 15, arranged to periodically start a session on its own initiative or in response to periodic requests from the connected peripheral.

17. (Previously presented) A peripheral interface, for serial data communication between a connected host and a peripheral during a session, the peripheral interface comprising:

a power signal contact for receiving power from the connected host;

at least one data signal contact for serially communicating data between the connected host and peripheral;

means for periodically checking for disconnection from the host comprising:

transmission means for repeatedly sending a first poll signal via the power signal contact and for repeatedly sending a second poll signal via the data signal contact;

reception means for receiving a reply signal via the power signal contact; and

detection means for detecting the absence of a reply signal and the disconnection of the peripheral.

18. (Original) A peripheral interface as claimed in claim 17, arranged to periodically request a session.

19. (Original) An interface as claimed in claim 18, wherein each request has a duration less than 100ms.

20. (Cancelled)

21. (Cancelled)

22. (Previously presented) A method of checking a serial data connection between a dual mode device and another device, comprising:

periodically starting a session at the device connected as host when the dual mode device is connected as a default host; and

periodically requesting the start of a session at the device connected as a peripheral when the dual-mode device is connected as a default peripheral.

23. (Currently amended) An interface for use in a device, the interface for connecting the device to a serial data communication bus either as a default host or as a default peripheral, serial data communication occurring between a host and a peripheral connected to the serial data communication bus during a session, the interface comprising:

a power signal contact;

at least one data signal contact;

a transceiver arranged to periodically check a connection by periodically starting a session when the device is connected as a default host and by periodically requesting a session when the device is connected as a default peripheral; and

wherein when the device is connected as a default host, the transceiver is operable to periodically check a connection by periodically applying a voltage to the power signal contact and receiving a response via the data signal contact, and when the device is connected as a default peripheral, the transceiver is operable to periodically check a connection by periodically requesting a session via the power signal contact and the data signal contact and receiving a response via the power signal contact.

24. (Currently amended) An interface for use in a device, the interface for connecting the device to a serial data communication bus either as a default host or as a default peripheral, serial data communication occurring between a host and a peripheral connected to the serial data communication bus, the interface comprising:

a power signal contact;

at least one data signal contact; and

electronic circuitry for repeatedly sending a poll signal via the power signal contact to check a connection and for receiving a reply signal via the power signal contact, if the device is connected as a default peripheral and via the data signal contact if the device is connected as a default host, wherein the reply signal indicates the presence of a connected device.

25. (Previously presented) A host interface for use in a host, the host interface for connecting the host to a serial data communication bus, serial data communication occurring between the host and a peripheral connected to the serial data communication bus during a session, the host interface comprising:

a power signal contact for supplying power to the connected peripheral;

at least one data signal contact for serially communicating data between the host and connected peripheral;

electronic circuitry for periodically checking for disconnection from the peripheral, wherein the electronic circuitry is arranged to repeatedly send a poll signal via the power signal contact and is arranged to receive a reply signal via the data signal contact; and

detection means for detecting the absence of a reply signal and the disconnection of the peripheral.

26. (Previously presented) A peripheral interface for use in a peripheral, the peripheral interface for connecting the peripheral to a serial data communication bus, serial data communication occurring between the peripheral and a host connected

to the serial data communication bus during a session, the peripheral interface comprising:

- a power signal contact for receiving power from the connected host;

- at least one data signal contact for serially communicating data between the connected host and peripheral;

- a electronic circuitry for periodically checking for disconnection from the host, wherein the electronic circuitry is arranged to repeatedly send a first poll signal via the power signal contact and to repeatedly send a second poll signal via the data signal contact and is arranged to receive a reply signal via the power signal contact;

and

- detection means for detecting the absence of a reply signal and the disconnection of the peripheral.